

AMENDMENTS TO THE CLAIMS

Please replace the claims, including all prior versions, with the listing of claims found below.

Listing of Claims:

1. (Previously Presented) A method for designing a technical system, comprising the steps of:
 - a) providing a substitute model that describes measurement data of a predetermined system;
 - b) determining a numerical value for a quality of said substitute model by comparing said measurement data of said predetermined system with data determined by said substitute model;
 - c) adapting said substitute model from said numerical value for said quality to be as high of a quality as possible;
 - d) applying said substitute model adapted with regard to its quality in a design of said technical system.
2. (Previously Presented) The method as claimed in claim 1, wherein said substitute model is a regression model.
3. (Previously Presented) The method as claimed in claim 1, wherein said step of determining a numerical value for a quality further utilizes a mean square deviation of said measurement data from said data determined by said substitute model.
4. (Previously Presented) The method as claimed in claim 1, further comprising the step of: sorting said measurement data according to their quality, with respect to the deviation of the latter from said data determined by said substitute model; and picking out a predetermined number of n% of worst measurement data.
5. (Previously Presented) The method as claimed in claim 1, further comprising the step of: sorting said measurement data according to their quality, with respect to the deviation of the latter from said data determined by said substitute model; and picking out a predetermined number of n% of worst measurement data unless this data lie in a continuous range.

6. (Previously Presented) The method as claimed in claim 1, further comprising the step of: reducing an amount of measurement data in the course of a preprocessing operation.

7. (Currently Amended) The method as claimed in claim 6, further comprising the step of: classifying, in ~~which~~ said preprocessing operation, of said measurement data.

8. (Previously Presented) The method as claimed in claim 1, further comprising the step of: controlling a technical plant utilizing said data obtained by designing.

9. (Currently Amended) The method as claimed in claim 8, further comprising the step of: online ~~adapting~~ adaptive control for said technical plant.

10. (Currently Amended) An ~~arrangement~~ apparatus for designing a technical system, comprising: a processor unit which is set up in such a way that

a) measurement data of a predetermined system are described based on a substitute model and stored in said processor unit;

b) a numerical value for a quality of said substitute model is determined by said processor unit by comparing said measurement data of the predetermined system with data determined by said substitute model; and

c) said substitute model is adapted, utilizing said processor unit, from said numerical value for said quality to be as of high a quality as possible, wherein said substitute model adapted with regard to its quality is used for designing said technical system.